the public, of a generator of ultraviolet energy. Under rule 11 of its Official Rules, the Council will declare inadmissible for inclusion in its list of accepted devices for physical therapy apparatus manufactured by a firm whose policy is in this matter detrimental to public welfare.

There comes a time in the career of almost every physician when he has a desire to communicate his experiences in the practice of medicine to his colleagues. It may be the report of a single case or it may be the publication of an epoch-making discovery, but the success he attains in conveying his message to others in a written paper will depend largely, if not entirely, on how it is presented. He may have been a very successful physician who has read widely, but when it comes to conveying his own thoughts to others through the printed page he may find it extraordinarily difficult.

The reviewer of current medical literature is thoroughly cognizant of the fact that much valuable information is entirely lost annually in the vast number of papers published, because the authors fail to assist the reader in arriving at the true meaning quickly and easily with the least amount of mental effort. The busy reader usually prefers to pass on to the more readable paper. The author's style did not command the respect, interest and attention that it may have otherwise received. It is, therefore, not difficult to understand that badly arranged and poorly planned papers rarely secure more than a brief glance from the reader and editor, regardless of their merit and the information the contribution may contain.—Internat. Med. Digest.

The doctor who succeeds in private practice today will do so for precisely the same reasons that the proverbial old time family doctor succeeded. There are a few basic principles of success—some inherited and others acquired.

Doctor Francis Graham Crookshank (Forum, February) discusses one of the most important and the one most frequently overlooked. "Cases" are as cold-blooded and impersonal as a forge in a Ford factory, disease is little better.

It is patients, persons, individuals (not cases nor diseases) who require service, and any physician who forgets or ignores the fact is doomed to failure. True, some such do make money, but they never become physicians.

The plea that successful busy practitioners with limited time and special skill cannot afford to care for those in moderate circumstances sounds reasonable. But such doctors can do much in the way of extending their skill to the care of this class of patients by using the younger men in the profession ostensibly to look after detail, but in reality to do the work. By so doing they discharge a threefold duty.

First: They assist materially in aiding the younger men to gain the confidence of the laity earlier than they would otherwise.

Second: They do not enrich the harvest field of the quack and cultist with patients who should go to our vounger men.

Third: They do not drive to free clinics people of moderate means, who are able and desire to pay what they can.—S. D. Van Meter, Colorado Med.

## MEDICINE TODAY

Current comment on medical progress, reviews of selected books and periodic literature, by contributing editors

The Editor: Judged by responses from contributors and readers, "Medicine Today" fills a need, and one that is being met with astonishing effectiveness.

In order that the obvious purposes of the department may continue to be best carried forward, contributing editors should bear in mind that clarity and brevity are the essence of good writing of this character. Editorials, comments, résumés and reviews, of less than 500 words, are the most valuable, and those of over 750 cannot be used. Brevity and clarity are easily possible by sufficient limitation of the subject and by writing, rewriting, condensing, revising, polishing and repolishing, until not only does the editorial as a whole carry a definite message, but until each sentence means something worth while.

Copy for each issue must be in our hands by the tenth of the month preceding publication.

## Anesthesiology

THE increased interest in and use of local anesthesia in major surgery was stressed at the Congress of Anesthetists, which convened with the British Medical Association at their annual meeting at Nottingham in July, 1926. At the joint meeting of the Section on Anesthesia with the Surgical Section, Professor Finsterer of Vienna, who demonstrated his methods in San Francisco a couple of years ago, reported 807 abdominal sections under splanchnic anesthesia without a death. He emphasized the dangers of ether and deplored the impossibility of using gas in his clinic because of cost and the lack of qualified administrators. He strongly advocated "combined anesthesia," i. e. local and nitrous oxide and oxygen, in those cases where local alone proves inadequate.

Anesthesia in relation to cardiovascular affections was the subject of a paper by F. W. Price of London and the discussion by Blomfield, author of a new treatise on anesthesia, and Ernest Von der Porten of Hamburg was of much interest.

The president-elect of the British Medical Association, Sir Robert Philip of Edinburgh, where the next annual meeting is to be held in celebration of the centenary of Lister, emphasized the rôle of the anesthetist as the "physician of the surgical team."

The meetings of the Scottish Anesthetists in Glasgow and Edinburgh and those in Nottingham with the British Medical Association have been reported at length in the Journal of the British Medical Association, the Lancet, and the British Journal of Anesthesia.

Professor Haldane presented a paper on the "Physiology of Respiration" to the Anesthetic Section of the Royal Society of Medicine, London, which is published in the October number of the Proceedings of the Royal Society of Medicine. Anesthetists will find much of value in this paper on the respiratory problems of anesthesia.

The clinics arranged for the viciting anesthetists at the Glasgow Royal Infirmary, the University of Edinburgh, Bartholomew's, Guy's, Middlesex and the Royal Dental Infirmary, London, impressed them with the skill and training along physiological and pharmacological lines of the British anesthetists.

A unique method of anesthesia in upper abdominal surgery was described and demonstrated by C. Langton Hewer of London. The trachea is catheterized by direct vision with a laryngoscope under ether, and anesthesia maintained with nitrous oxide, oxygen and ether. By increasing the proportion and pressure of oxygen, the respiratory movements can be brought down to practically zero as the blood is sufficiently oxygenated, thus obtaining an immobile field for the surgeon's manipulations.

The deep degree of anesthesia necessary to obtain the so-called "slack abdomen" required by British surgeons is responsible for the adherence to chloroform in many cases and also accounts for the absence of technician anesthetists. This also explains the practice of omitting morphin in the preoperative medication and the use of large doses of atropin. The preference for chloroform is declining, however, and the value of carbon dioxide for respiratory stimulation and deetherization is well recognized. Nitrous oxide and oxygen is gaining ground rapidly and much interest was shown in the demonstration of his gas and oxygen apparatus by McKesson.

The method of having but one or two papers with full and free discussion, which obtains at the British meetings, was noteworthy.

The Associated Anesthetists of the United States and Canada carried home many memories of the high professional attainments, as well as the cordial hospitality of their hosts, and are looking forward to the next congress with the British Medical Society, which is to take place in Winnipeg in 1930.

The development of the various methods of local and regional anesthesia offers the hope of solving one of the problems of the specialty of anesthesiology. If a large percentage of the operations which at present require general anesthesia may be properly done with the use of local, the need for the great numbers of anesthetists, which are necessary at present, will be obviated and a higher type of anesthetist will be produced.

MARY E. BOTSFORD.

## Communicable Diseases

HE Rôle of Toxins in Certain Infectious ■ Diseases—It is incredible that almost twenty years elapsed between the first reports of Savchenko's 1 toxin and antitoxin for the scarlet fever streptococcus and the more recent work of Dochez 2 and later the Dicks,3 who were able to confirm the pioneer investigations and put their own discoveries to a practical test. Today, aside from a number of unexplained inconsistencies of a bacteriological and immunological nature, the rationale of scarlet fever toxin and antitoxin is probably established.

The impetus given to similar investigations by such work has put experimenters on the trail of a toxin for the streptococci found in measles. The studies by Hektoen's associates,4 reported from Chi-

cago during the past year, bid fair to settle an old controversy if the work should be confirmed. The clinical manifestation of the exanthemata should have suggested ere this the probable rôle of toxins in these diseases.

More surprising than the unaccountable mental and experimental lag regarding scarlet fever, measles. and related infections, is the absence of fundamental investigations concerning the part which toxins seem to play in acute rheumatic fever and particularly in subacute bacterial endocarditis. Granted that the bacteriology and immunology in these diseases are not yet on an established basis, due to difficulties in technique and in classification of the strains of organisms, none the less, studies with Berkfeld filtrates of some of the streptococci may yield important and surprising data. There are cogent reasons for suspecting a bacterial toxemia in subacute endocarditis. Not the least of these is the localization of the organisms in certain parts of the body while appearing in relatively small numbers in the circulating blood and producing a toxemia out of all proportion to their number found during life or after death. In this regard the conditions do not differ essentially from those in other infectious diseases caused by toxin-producing bacteria. While a most recent report by Small 5 on the etiology of rheumatic fever lacks certain necessary controls to make the study convincing, it does suggest forcibly the need for further work along the lines of bacterial toxins in this disease.

Finally, one is led back over the old and wellbeaten trail of tuberculosis. Here too it is astonishing that the rôle of toxins as the most important aspect of the clinical findings has been utterly disregarded until within recent months. As early as 1903 Denys 6 described laboratory and clinical experiments with a Berkfeld filtrate of bouillon cultures of tubercle bacilli. It is important to recall that this substance had not been altered by him either physically or chemically and could be readily destroyed by heating. Here we have the germ, so to speak, of a toxin! So engrossed was Denys with the therapeutic possibilities of his "B. F." (bouillon filtré) that he failed to devise experiments necessary to establish fundamental principles upon which the identification of a toxin must be based. So, too, Spengler 7 missed an opportunity in his researches on a bouillon filtrate. Recently, however, clinical and laboratory investigations 8 reported from the University of California appear to have thrown new light on the fundamental mechanism of toxin production by the tubercle bacillus and the rôle of such toxins in the diagnosis and possible therapeusis of the disease. These researches, furthermore, have offered decisive evidence that the tuberculin substance is entirely different from and bears no relation to the toxin element.

The old is ever new and the new ever old in the field of medical discovery.

Frederick Eberson.

<sup>1.</sup> Savchenko, I. G.: Russk. Vrach. St. Petersburg, 1905, 4, 797.
2. Dochez, A. R., et al.: J. A. M. A., 1924, 82, 542; J. Exper. Med., 1924, 40, 253; ibid., 493.
3. Dick, G. F., and G. H.: J. A. M. A., 1924, 82, 265; 84, 803 Tunniclice, R., et al.: J. A. M. A., 1926, 87, 846; ibid.,

<sup>5.</sup> Small, J. C.: Am. J. M. Sc., 1927, 173, 101.
6. Denys, J.: Le Boillon Filtré, Paris and Louvain, 1905.
7. Spengler, C.: Zeitschr. f. Hyg. u. Infektionskrankh.
1897, 26, 323.
8. Eberson, F.: Proc. Soc. Exp. Biol. and Med., 1926, 24,
79; J. A. M. A., 1926, 88, 313; Am. Rev. of Tuberculosis,
1927, 15, 127; Proc. Soc. Exp. Biol. and Med., 1927, 24, 329.